CITY OF DURHAM – KIMLEY-HORN & ASSOCIATES, INC. ON-CALL SUPPLEMENTAL AGREEMENT #8 TO THE MASTER AGREEMENT DATED DECEMBER 21, 2009

THIS SUPPLEMENTAL AGREEMENT is made the _____ day of _____, 2012 by and between the City of Durham, Durham County, North Carolina (hereinafter called the "Client" or "City") and Kimley-Horn & Associates, Inc. ("Kimley-Horn" or the "CONSULTANT") in accordance with the terms and conditions of the Master Agreement for Transportation Engineering and Planning Services dated December 21, 2009, which is incorporated herein by reference.

I. PURPOSE:

The purpose of this supplemental agreement is for the CONSULTANT to provide on-call transportation planning, transportation engineering, and technical related services, as assigned, in accordance with the Master Agreement dated December 21, 2009, and the Scope of Services described below. The primary purpose of this supplemental agreement is to conduct a Comprehensive Parking Study of the Downtown and Ninth Street parking areas. The City desires to evaluate the parking it manages primarily within the Downtown area and learn how that parking can be managed and operated in a more effective and customer friendly manner. The Downtown is experiencing growth and development and it is expected that the City's parking operations should support the vision and growth of the Downtown since many businesses rely on the City's parking facilities for their livelihoods. Consequently, this Comprehensive Parking Study should determine if the current parking supply in the Downtown area is adequate under existing conditions and for future conditions as the City becomes more developed. If a parking shortfall or deficit is identified, the study should identify potential sites suitable for increasing parking supply. The goal of the Comprehensive Parking Study is to prevent parking issues from developing without over-building parking supply, both of which would lessen the quality of life for the City's residents, property owners, merchants and visitors. The Comprehensive Parking Study should provide guidance to the City Council in the formulation of policies to address the on-going development of Downtown while preventing parking issues from developing and help to ensure that existing off and on-street parking supply is being efficiently and effectively utilized. The Comprehensive Parking Study should make targeted and specific recommendations regarding adequacy of parking, transportation demand management measures, parking management, pricing (both off-street and on-street for short and long term), and financing of new parking facilities. In addition to the Comprehensive Parking Study within the Downtown area, the City would also like to study the identified Ninth Street parking area (see attached map). In this area, the study should encompass the following tasks only: Task II: Review and Background Documentation Relating to Existing Conditions, Task III: Inventory of Current Parking Capacity, Task IV: Assessment of Current Parking System Utilization, Task V: Supply/Demand Analysis and Projection of Future Parking Needs, Task VI: Development of Supply Side Solutions, and Task X: Recommendations and Financial Plan for Meeting Future Parking Needs.

II. SCOPE OF SERVICES:

Downtown

Task 1:

Study Area

The project area for the Downtown parking study is shown in the attached map.

Task I – Project Management

Project Management Team

Kimley-Horn will provide project management services continuously throughout the course of the project and shall communicate progress and recommendations to the designated City Project Manager in an efficient and time responsive manner. The Downtown Parking Comprehensive Parking Study is scheduled to be complete in approximately six months.

Parking Study Team

Working closely with the Kimley-Horn team will be the Parking Study Team (PST), which will be appointed by Durham's Director of Transportation. The City will designate a primary point of contact for the PST. This contact will be Kimley-Horn's liaison for the purpose of communication, scheduling meetings, etc. during the project. The City will provide Kimley-Horn with the names and contact information for all members of the PST prior to the initial kick-off meeting.

A stakeholder group of Downtown developers, businesses, parking operators, theater owners, residents, etc. will be formed to offer input to the Kimley-Horn and the PST at appropriate times during the study. The City will be responsible for identifying the members of the stakeholder group, briefing them on the purpose of the study and inviting them to the first stakeholder meeting. The City will provide Kimley-Horn with the names and contact information for the members of the stakeholder group prior to the initial kick-off meeting.

Project Meetings

In completing this project, it is anticipated that both "formal" and "informal" project meetings will be required.

Formal project meetings: Kimley-Horn will prepare agendas for, attend, and document with meeting minutes the following formal project meetings:

- Project kick-off meeting to be held with the PST at City Hall approximately two weeks after the execution of the contract.

- Stakeholder meeting #1. Location to be determined. The purpose of this meeting will be to present an overview of the study, including the study purpose, schedule, and final product. Kimley-Horn will prepare and make a presentation to the stakeholder group. The proposed survey discussed in Task II will be previewed at this meeting and made available to the stakeholders. This meeting will be held on the same day as the project kick-off meeting.
- Stakeholder meeting #2. Location to be determined. The purpose of this meeting will be to gather the stakeholder group to obtain their input and perceptions on parking in the Downtown and to review the preliminary results of the survey. A formal presentation will not be prepared for this meeting as the purpose will be to listen to stakeholders. Alternatively, this meeting could be a drop-in session where stakeholders are invited to give their input in small groups or in a one-on-one format to facilitate input.
- Parking Study Team meeting #1. To be held at City Hall. The purpose of this meeting will be to present initial findings — collected as part of Tasks II, III and IV — and critical issues. A technical memorandum documenting the findings of Tasks II through IV will be prepared and submitted at this meeting. Representatives of the stakeholder group may be invited to attend portions, or all of this meeting.
- Parking Study Team meeting #2. Held at City Hall. The purpose of this meeting will be to present preliminary recommendations. The results and recommendations of Tasks V, VI, VII, and VIII will be presented at this meeting. A technical memorandum will be submitted. This meeting may include stakeholders.
- Parking Study Team meeting #3. Held at City Hall. The purpose of this meeting will be to present the final report to the PST. Final recommendations from Tasks V, VI, VII, and VIII, as well as recommendations from Task IX and X will be included in the final report and presented at this meeting.
- Meetings with City Manager and City Council. The purpose of these meetings/presentations will be to present the study findings and recommendations to City Management. One meeting with the City Manager and one presentation to City Council is assumed.

Informal project meetings: Kimley-Horn will attend additional informal project meetings when needed or desired by the City. We will attend up to four additional informal project meetings. The timing and content of these meetings are flexible since they are intended to be informal, but they could include:

- An additional meeting with key project stakeholders.
- A meeting with members of the PST to review the initial findings prior to PST meeting #2.

- A meeting with members of the PST to review final recommendations prior to their presentation to the entire PST.
- A meeting with members of the PST to review the information to be presented to City Council.

Deliverables

Draft meeting agendas will be submitted via email to the designated PST contact five work days prior to the dates of scheduled meetings. Draft meeting minutes documenting project meetings will be submitted to the designated PST contact manager within five working days after a project meeting. Upon review of the minutes by the designated contact, Kimley-Horn will revise the meeting minutes. Upon mutual agreement, final meeting minutes will be distributed to all meeting attendees either by Kimley-Horn or the PST contact.

Kimley-Horn will prepare monthly progress reports that identify the progress on the project, the status of the project with respect to schedule and any outstanding events. The progress report will be submitted in conjunction with the monthly invoice.

Final Report

Kimley-Horn will prepare a Downtown Comprehensive Parking Study report that documents the overall process; data collected; input from stakeholders; research and analyses performed; recommendations, including a strategic parking management plan with specific goals and action plans for immediate (6 months to 2 years), short-term (3 to 5 years), and long-term (6 to 10 years) implementation.

The final report will consist of approved technical memoranda delivered for each task in the plan process. The Final Report will include maps, color figures, forms, survey results, and other supporting documents. A digital copy in Adobe portable document format (PDF) and 10 printed color copies will be submitted to the PST.

Task II – Review of Background Documentation Relating to Existing Conditions

In conjunction with other data collection efforts, Kimley-Horn will review previously conducted reports, studies, and other information provided by the City relevant to Downtown access, mobility, and parking. The following studies and data sources will be reviewed and used:

- Durham Downtown Master Plan
- City Center Market Retail Study
- Durham County Parking Study Report
- City of Durham Capital Improvement Plan
- Durham Downtown Loop – Two-Way Conversion Study
- Any existing parking supply/demand or utilization/turnover data
- Current and pending City Unified Development Ordinance (UDO) parking requirements

- Meetings with Downtown Durham Incorporated to obtain background on future development activity.
- The previous Downtown Durham Parking Study

.Kimley-Horn will request information from the City regarding planned or potential land use developments within the study area, as well as general land use trends occurring and envisioned within the Downtown area. This information will be important for assessing mid- and long-term parking demands, and will be incorporated into our parking demand model.

As noted in Tasks I, part of the public outreach efforts will focus on gaining input and opinions related to the Downtown parking experience, its challenges, perceptions, and opportunities. This will occur through a parking survey and meetings with the PST and key Downtown stakeholders. The stakeholder groups should include Durham City and County staff, Downtown residents and business owners, visitors/commuters, parking system operator representatives and others as deemed appropriate.

Kimley-Horn will prepare an online survey that will help expedite and enhance the public outreach activities of this project. A draft of the survey (in hard copy format) will be submitted to the City for their review. Upon approval by the City, Kimley-Horn will activate the on-line survey and make the link available to the public.

An outline and summary of all public involvement elements will be included in the Final Report, and will include stakeholder and pertinent public comments, a summary of survey data, and key points identified in the review of existing plans and programs. Kimley-Horn also will provide the City with electronic copies of any PowerPoint presentations used in stakeholder meetings or public forums.

Task III – Inventory of Current Parking Capacity

Kimley-Horn will collect the necessary data in the Downtown Study area to understand the existing parking inventory in the study area. The inventory will include information related to the following elements:

- Type (identified principal user, on-street vs. off-street, public vs. private, surface vs. structured, etc.)
- Location and general configuration
- Capacity (number of spaces)
- Identification of difficult-to-find parking locations (perceived and real)
- Parking rates
- Time and use restrictions
- Designated on- and off-street handicapped spaces
- Designated compact spaces
- Designated motorcycle spaces
- Designated electric vehicle charging spaces

- Loading zones
- Bus stops
- The number and capacity of bicycle racks or bicycle storage units

Kimley-Horn will summarize the information collected and present the data graphically for meetings with stakeholders and for final reporting. All mapping developed for the project will be prepared using Geographic Information Systems (GIS). This approach will enable us to seamlessly integrate the parking facility database and mapping with the parking demand model developed in Task V. Linking the database to the mapping will allow input changes in the database to have a dynamic impact on the mapping output. This ability to visualize existing conditions using different metrics will be valuable when identifying problems and determining recommendations.

Deliverables

Kimley-Horn will prepare digital maps, in GIS format with a reference numbering system, that identify existing parking facilities. These maps will link to an electronic inventory that also will be provided.

Task IV – Assessment of Current Parking System Utilization

To determine current parking system usage, off-street parking occupancy data will be collected in the Downtown Study area by Kimley-Horn for a typical weekday—Tuesday, Wednesday, or Thursday—every hour from 9:00 a.m. – 6:00 p.m. in the public and privately owned parking lots. Occupancy data will be collected during the same period for on-street parking as well. The on-street data will be categorized by use and time restrictions (e.g., handicap, loading, reserved, 2-hour limit) and the off-street data by facility. This will be consistent with the database and mapping created as part of Task III.

For on-street facilities, parking duration and turnover measurements will be conducted in representative areas. The duration and turnover measurements will be obtained in conjunction with the occupancy data collection. We will record this information and summarize it by block, by parking type—curb, lot, or garage; and by parking analysis zone. This information will be analyzed and displayed in formats that reveal utilization and occupancy levels by time of day.

Kimley-Horn will also collect evening parking utilization information. In the following locations, parking occupancy and turnover measurements will be conducted from 6:00 p.m. – 10:00 p.m. during a typical evening:

- Five Points
- Central Park (DAP/Geer Street/Garden Motor Company/Fullstream Area
- West Main from Loop to Duke
- Bright Leaf Square

- Blackwell Street
- American Tobacco Parking Decks
- County Administration
- Arts Council
- Carolina Theatre

Nighttime parking information will be collected on up to two evenings.

Kimley-Horn will also collect nighttime parking utilization information during peak (Thursday, Friday and Saturday) evenings. Occupancy data for off-street parking will be recorded every hour from 5:00 p.m. – 10:00 p.m. for the Downtown Study area.

For on-street facilities, parking duration and turnover measurements will be conducted in representative areas. The duration and turnover measurements will be obtained in conjunction with the occupancy data collection. We will record this information and summarize it by block, by parking type—curb, lot, or garage; and by parking analysis zone. This information will be analyzed and displayed in formats that reveal utilization and occupancy levels by time of day.

Kimley-Horn will use parking utilization and occupancy data developed as part of Task IV, to identify areas of particular concern in terms of parking sufficiency, or areas with a significant surplus of parking capacity. This understanding of where actual utilization exceeds intended utilization, or vice versa, will enable us to determine strategies to balance parking system requirements throughout the City.

We propose to use a combination of the parking utilization and occupancy data to determine areas of peak vehicular accumulation for different time periods throughout the day, i.e. morning, noon, and afternoon. As part of this analysis, we will identify the peak hour(s) for the different facility types—private, paid public, and free.

We will perform a turnover analysis that will compute average length-of-stay statistics based on the parking occupancy and utilization data. This analysis will be conducted using spreadsheets that will be included in the Appendix of the Final Report. The length-of-stay analysis will show vehicle accumulation patterns throughout the day. This analysis also will highlight any widespread issues with overstay when compared to time limit restrictions.

Kimley-Horn will use historical data provided by the City to perform a general analysis of trends related to changes in the parking supply. We will review seasonal and monthly parking revenue data from Lanier Parking to help determine design day adjustments and seasonality factors for times of the year outside the data we collect. These factors will be important in the future when the parking demand model—developed in Task V—is turned over to the City.

Kimley-Horn will consult with the City to determine likely origins of parking demand through the Downtown study area. This will include tabulation of land uses that are presumed to contribute to parking demand in each area of interest. The result will be used to compare the current parking occupancy to the overall parking system objectives.

Deliverables

Kimley-Horn will provide graphic output of the parking system utilization data collected in this task in the form of mapping files linked dynamically to the parking demand model. The graphic output will require specific GIS data from the City, such as:

- Parcel files
- Building footprints
- Roadway centerlines
- Aerial photography

Kimley-Horn will provide one ArcGIS-based mapping file, with parking inventory data loaded in the mapping software. The parking inventory will include a summary of capacity and occupancy data, in addition to other information obtained during Tasks III and IV. Guidance can be provided to City staff on updating and maintaining this data for future use. The ArcGIS map also will have customized tools to identify existing public parking walking tolerances, block-by-block parking information related to the model and inventory, and development tools to identify available parking within specific walking tolerances of new projects. The map and all associated shapefiles will be provided to the City upon completion of the project.

Task V – Supply/Demand Analysis and Projection of Future Parking Needs

Demand Model and Assessment

Kimley-Horn will develop a parking demand model for the Downtown area of Durham, NC. Using the data collected, Kimley-Horn will develop an Arc-GIS parking demand model application for the study area. Output data from the model will represent the total number of net new parking spaces required to meet the projected parking demand, based on the future development information gathered, recommended management strategies, and future alternative transportation enhancements. The model is predicated on land use mix and development intensities, existing parking inventories, travel mode split, potential shared-use parking strategies, and parking generation rates published by either the Urban Land Institute or the Institute of Transportation Engineers. The model will first be developed and calibrated for existing conditions and then be used to forecast future year demands based on the two-, five-, and 10-year forecast horizons.

The Downtown study area will be divided into subareas to represent smaller functional areas within the main study area. Kimley-Horn will obtain available data on existing land uses within the study area to confirm existing square footage of office, retail, restaurants, etc. Kimley-Horn will coordinate with the City, County and Downtown Durham Incorporated to obtain data on current and proposed land uses that may affect the

parking demand in the study area in the future years forecasted. Proposed projects that currently are in the planning stages will be included in the study to assist with projected parking demands over the foreseeable future. In addition, demand reduction percentages for transit, bicycling, and walking will be estimated based on local or census data and will be used in the model, allowing further flexibility in estimating future demand. The demand model will provide the City with an analysis tool to evaluate the effects of adjusted land use requirements or building vacancy as part of the overall demand analysis. Results of the parking demand model will be shown graphically, which will provide the City a means for visual representation of parking demand data and zonal deficit information.

The model will be used to identify areas of high parking demand and to develop recommendations to reduce intensity. Recommendations could include locations for increased parking supply through new facilities or expansion of existing facilities, relocation of on-street delivery truck and tour bus queuing areas, and locations or destination suitable for potential additional transit service. These recommendations will be developed and communicated to the City and in the report graphically, providing visual representation of each recommended item and location.

Deliverables

Kimley-Horn will develop a report that outlines the assumptions and nuances of the parking demand model, as well as the recommendations associated with the results of the study. Also included in the report will be the graphics and tabulations developed throughout the data collection and analysis phases of the project. It is assumed that Kimley-Horn will provide a draft version of this report to the City for review and comment. After receipt of comments, Kimley-Horn will finalize the document and provide hard and electronic versions of the report to the City.

In addition to the report, Kimley-Horn will provide the City with the parking demand model in Arc-GIS format. Kimley-Horn also will offer a one-day training session with select City staff to go through the model step-by-step to communicate its capabilities. An instruction manual for the model with example future development scenarios also will be provided to the City as a reference tool.

Task VI – Development of Supply Side Solutions

Using the data collected in Tasks II through V, the parking demand model, and our experience with best practices from other cities, Kimley-Horn will evaluate the current parking locations and management operations of the City and provide recommendations in an effort to optimize use and management of the overall parking supply. Potential recommendations could include modifications to current restrictions, rate adjustments, parking allocation, and other parking management strategies, in addition to signage recommendations to increase the use of hard-to-find parking locations.

Kimley-Horn will perform the following subtasks:

1. Review opportunities for more effective utilization of existing parking resources, including considerations of:
    a. Shared parking
    b. More efficient parking facility layouts (modifications to striping and circulation)
    c. Improved information system and wayfinding (also addressed in Tasks VII and IX)
2. An assessment of the City's on-street parking program. The assessment shall include:
    a. A review of current City policies and parking system management practices related to:
        i. Use of time-limited parking (specific time limits)
        ii. Hours of enforcement
        iii. Enforcement responsibility, methods, coverage, and staffing levels
        iv. Loading zone placement relative to demand
        v. Construction staging areas
    b. The factors that may make it effective to implement a fee for on-street parking using pay stations and/or multi-space meters.
    c. A general assessment of identified enforcement deficiencies related to effectiveness and general goals established for the on-street parking program, including recommendations to address any such deficiencies.
3. The following specific issues related to the management of the current parking system will be addressed:
    a. Evaluation of the current pricing system for municipal parking facilities with regard to demand, convenience, and free parking.
    b. A review of the hours of operation of the City's parking facilities.
    c. An assessment of the current usage of handicapped parking placards in the study area, including occupancy statistics, turnover, and an opinion of abuse or detectable fraud. A rotating, four-hour inspection conducted over two days will be performed to observe the current handicapped parking conditions.
    d. An assessment of feasibility of implementing a residential parking permit program, as applicable. The City would like to update its policies related to residential parking in public parking facilities. A technical memorandum will be prepared that outlines the operating features of the program, enforcement issues, costs, benefits, and drawbacks.
4. A review of existing procedures for special event parking. After reviewing existing procedures, Kimley-Horn will observe parking operations for up to two special events and offer recommendations as appropriate. The special events to be observed will be mutually agreed upon by the City and Kimley-Horn.

Deliverables

The deliverable for this task will be a technical memorandum with specific recommendations and action plans for on-street and off-street side solutions. The memorandum will include the following:

1. A matrix of alternatives evaluated, including for each alternative:
    a. Goals and objectives
    b. Key issues and challenges
    c. Schedule for implementation and proposed sequencing
    d. General assessment of applicability, effectiveness and feasibility
2. An opinion of probable costs of the recommended alternative

Task VII – Development of Demand Side Solutions

Using the information collected in the previous tasks and our experience from similar studies in other cities, Kimley-Horn will develop measures to reduce parking demand and traffic congestion at the parking facilities in Downtown Durham and present these measures to the PST. To complete this task, we will draw upon our expertise in transportation demand management (TDM). TDM generally refers to a variety of strategies and technologies aimed at increasing the use of transit, carpools, vanpools, and other alternative commute modes; reducing single-occupant vehicles; encouraging the use of bicycling and teleworking; and spreading the travel to less congested time periods. As part of this study, Kimley-Horn will perform an evaluation, including development of opinions of probable cost, of innovative parking guidance technologies that help guide customers to available parking in real-time.

Upon our review of the demand side solution options, we will provide specific recommendations for the City's consideration. The recommendations will be designed to preserve or increase current net parking revenues generated by the City's parking facilities.

The following strategies will be considered:

1. Different parking fees based on facility location and convenience
2. Pricing differentials for peak demand periods
3. Preferred parking for carpool and vanpool participants
4. Parking cash-out programs
5. Improved pedestrian circulation and access
6. Vehicular wayfinding improvements to parking facilities within the study area
7. Intelligent transportation system (ITS) and other real-time information options.

Deliverables

As a result of this task, Kimley-Horn will prepare a technical memorandum and action plan that describes short- and long-term strategies with the goal of improving the

accessibility, efficiency, and utilization of parking in the study area. The memorandum will include the following:

1. A matrix of alternatives evaluated, including for each alternative:
    a. Goals and objectives
    b. Key issues and challenges
    c. Schedule for implementation and proposed sequencing
    d. General assessment of applicability, effectiveness, and feasibility
2. An opinion of probable costs of the recommended alternative
3. An action plan that identifies the role of the City, developers, property owners, parking managers, and parking companies in the implementation. The plan will include the following:

The identification of major privately owned parking facilities with unbundled parking that can be targeted for potential cash-out programs

Identification of locations for potential implementation of variable priced parking

Identification of existing parking facilities with capacity that are available for shared use to address current parking needs

Task VIII – Evaluation of Parking Policy and the Municipal Parking Program

Kimley-Horn will evaluate current management practices, policies, and standards to help the City define a more strategic and focused direction related to providing, managing, and efficiently using its parking resources. The components of this task include:

- A best practices review of other parking agencies throughout the country
- Specific peer city interviews for up to six similar communities (communities to be mutually agreed upon)
- Evaluation of funding strategies in use in other communities
- Evaluation of the City's zoning and parking-related ordinance language, including parking requirements
- Evaluation and recommendations for an optimal management and organizational structure for the City
- Cursory evaluation of current on-street and off-street revenue control equipment, including recommendations specific to the City's current parking infrastructure
- Review and evaluation of TDM strategies and their impact on parking demands in the community

Kimley-Horn will provide the City with a best management practices document. The document will include a summary of best management practices related to parking facility management, revenue control, organizational structure, system marketing and

branding, and beyond. This document will be included as an appendix to the overall report and is intended as a stand-alone document that will serve as a quick future reference for the City.

Kimley-Horn will interview up to six peer cities similar in size and nature to the City of Durham to determine their specific approaches to organizational structure, technology use, parking policies, oversight and management, and overall approach to providing and managing public parking. We will work with the City to determine who the six peer cities should be, then contact and interview representatives from each one. As part of the final report, we will document the findings of these interviews, including recommendations and best management practices that are practical for implementation in Durham. The peer city review will include a review of funding strategies in place in the peer communities. Kimley-Horn will supplement the information with additional research to help the City better understand the various funding strategies in use today.

Kimley-Horn will review and evaluate the City's existing parking and zoning ordinances to help define new approaches for better management of parking and implementation of parking policies. As part of this review, Kimley-Horn will review the City's current parking requirements and make recommendations for the implementation of new standards, whether they are minimum, maximum, or variable requirements. The intent is to provide the City with a tool to ensure proper parking sufficiency without over-building or under-building parking infrastructure.

Our team will review the City's current parking organization and help the City understand procedures for implementing a more effective and efficient organizational structure. A review and consolidation of the parking management entity within the City may lead to better efficiencies in management and operations, which could result in improved revenue and operating costs. Kimley-Horn will review the current structure, including job descriptions and responsibilities, and offer suggestions for organizational improvements based on our experience with numerous municipal parking operations throughout the U.S. to help the City determine the optimum method for managing its system.

Kimley-Horn will review current on-street and off-street parking technologies and provide the City with a synopsis of current offerings. This will include single-space credit enabled and multi-space on-street parking meters, pay-on-foot or pay-in-lane off-street systems, and various add-on features like pay-by-cell phone, parking sensors, and dynamic vehicle navigation systems. Kimley-Horn will provide a short presentation of these technologies at one of the scheduled PST meetings. Based on the discussions at that meeting, we will help the City determine recommendations for specific technology to pursue for implementation within the City.

Finally as part of this task, Kimley-Horn will evaluate the use of TDM strategies to influence parking behavior and help balance parking utilization and demand. Strategies could include congestion pricing, in-lieu fees, reduced parking requirements, enhanced

multimodal use, or alternate parking funding strategies. Kimley-Horn will review these strategies and provide direction on the general implementation and benefit of these strategies, especially in the development review process as a means for reducing parking infrastructure needs.

Deliverables

Kimley-Horn will prepare a technical memorandum summarizing our efforts and recommendations for this task. The report will include the following:

1. A summary of the interviews with the six peer cities
2. A description of the optimal method(s) for the City to meet Downtown parking needs
3. Recommendations for modifications to the City's organization structure for parking
4. Opinions of probable costs incurred for proposed changes
5. Evaluation of current staffing levels and recommendations, as appropriate
6. Assessment of applicable revenue control and collection technologies that would be suitable for Durham
7. Recommended funding strategies and options
8. Recommended parking and TDM policies and strategies

Task IX – Development of Public Information Tools

An important aspect of any parking system is the way in which the public is informed of parking facility locations, space availability, time restrictions, parking rates, and other related aspects of the system. This information is often delivered through maps developed and distributed by a variety of sources, including garage and parking lot signage, wayfinding signage, and various agencies' websites.. Kimley-Horn will review currently available public information tools and will make recommendations for developing comprehensive, consistent, and accurate means of effectively communicating parking system elements to the public. Recommendations likely will include a combination of traditional methods and new technologies, and may include but will not be limited to the following:

- Wayfinding signage consistent and compatible with pedestrian wayfinding signage already present in Downtown Durham
- Consistent signage and mapping
- Facility signage enhancements
- Destination signage
- Parking availability monitoring and communication
- Centralized website information
- Real-time message board, Internet, and phone-based traveler information systems
- Special event considerations

In addition to the information listed above, the final report will include general opinions of probable costs and the comparative effectiveness of best practice recommendations.

Task X – Recommendations and Financial Plan for Meeting Future Parking Needs

Using the information collected in previous tasks and input from the PST, Kimley-Horn will make recommendations for the type and size of additional parking facilities, if needed.

Kimley-Horn recognizes that the plan recommendations need to be grounded in financial reality. We will analyze the pros and cons of a variety of financing and funding options, including any combination of a parking tax and district, public/private partnerships, providing parking for commuters as a development approval condition, and parking fees.

Using historic financial information furnished by the City and our experience on other projects Kimley-Horn will develop a pro-forma model of future parking revenues and expenses of the parking system. The estimate will be prepared for years three, five and 10. The pro-forma estimate is for comparison purposes as well as preliminary budgeting of future years (this projection of revenue should not be used for seeking financing or for other external financial purposes).

The pro-forma estimate will include the following:

1. It shall be assumed the parking operations are financially self-sufficient.
2. Projected capital costs, replacement costs, maintenance costs, maintenance reserves, operational costs and administrative costs associated with oversight and contract management. The PST will assist Kimley-Horn with information regarding operational strategies (e.g., projected salary increases, equipment replacement cycles, etc.).
3. A proposed rate schedule for all City parking facilities, including off-street rates and rates for hourly and monthly parking. The pro-forma will include a schedule for proposed increases in parking rates in future years to maintain financial self-sufficiency.
4. The pro-forma shall account for recommended changes to the operational structure and/or operation of the City's parking program.

Kimley-Horn will provide a high-level assessment of the feasibility of monetizing portions (or all) of the City's parking assets. This assessment will include a discussion of the advantages and disadvantages of monetization and will outline the steps that would be undertaken if this alternative were pursued. This assessment will consider the following subtasks

1. Kimley-Horn will review what authority is provided for cities in North Carolina by the General Statues for parking, outsourcing, and financing and will advise the PST on how those statues will impact potential monetization.

2. Options to be assessed include up-front cash payments for reasonably expected parking revenues, public-private partnerships with revenue sharing, sale/lease back of facilities, and outright sale of the parking assets.

Deliverables

Kimley-Horn will prepare a technical memorandum that will include the recommendations and financial plan to meet the future parking needs of the study area. The memorandum will include the following:

Recommendations for expansion of parking capacity, including recommendations regarding the size and type (e.g., surface or structured) of facility.

A three, five and 10-year operation pro-forma as described above.

The findings and recommendations regarding the feasibility and monetizing any/all of the City's parking assets.

Ninth Street

Study Area

The project area for the Ninth Street parking study is as shown in the attached map.

Task I – Project Management

In order to facilitate input and obtain acceptance for the study recommendations, Kimley-Horn proposes the formation of a Ninth Street stakeholder group.

We suggest holding the following meetings for the Ninth Street Area study:

- Stakeholder meeting #2. Location to be determined. The purpose of this meeting will be to meet with the stakeholder group to gather their input and perceptions on parking in the Downtown and to review the preliminary results of the survey. A formal presentation will not be prepared for this meeting as the purpose will be to listen to stakeholders. Alternatively, this meeting could be drop-in session where stakeholders are invited to give their input in small groups or in a one-on-one format to facilitate input.

It is assumed that this study would be completed in approximately 10 weeks. Two meetings would be scheduled with the City's project steering team (PST).

Task II – Review of Background Documentation Relations to Existing Conditions

In conjunction with other data collection efforts, Kimley-Horn will review previously conducted reports, studies, and other information provided by the City relevant to the Ninth Street area access; mobility; development, both new and redevelopment; and parking.

Unless directed otherwise, our approach will be to assume that the recommendations from previous planning efforts are generally supported, except where obvious conflicts arise. However, our review will identify and examine strengths, weaknesses, opportunities, and threats related to existing conditions and the information listed above. Kimley-Horn also will request information from the City regarding planned or potential land use developments within the study area, as well as general land use trends occurring and envisioned within the Ninth Street area. This information will be important for assessing mid- and long-term parking demands, and will be used in our analysis.

As noted in Task I, part of the public outreach efforts will focus on gaining input and opinions related to the Ninth Street area parking experience, its challenges, perceptions, and opportunities. This will occur through meetings with the PST and key area stakeholders. The stakeholder groups should include Durham City staff, area residents and business owners, visitors/commuters, and others as deemed appropriate.

An outline and summary of all public involvement elements will be included in the final report, and will include stakeholder and pertinent public comments, a summary of survey data, and key points identified in the review of existing plans and programs. Kimley-Horn also will provide the City with electronic copies of any PowerPoint presentations used in stakeholder meetings or public forums.

Task III – Inventory of Current Parking Capacity

Kimley-Horn will collect the necessary data to understand the existing parking inventory in the Ninth Street study area. The inventory will include information related to the following elements:

- Type (identified principal user, on-street vs. off-street, public vs. private, surface vs. structured, etc.)
- Location and general configuration
- Capacity (number of spaces)
- Identification of difficult-to-find parking locations (perceived and real)
- Parking rates
- Time and use restrictions
- Designated on- and off-street handicapped spaces
- Designated compact spaces
- Designated motorcycle spaces
- Designated electric vehicle charging spaces
- Loading zones
- Bus stops
- The number and capacity of bicycle racks or bicycle storage units

We will summarize the information collected and present the data graphically for meetings with stakeholders and for final reporting. All mapping developed for the project will be prepared using GIS.

Kimley-Horn will prepare digital maps, in GIS format with a reference numbering system, that identify existing parking facilities. These maps will link to an electronic inventory that also will be provided.

Task IV – Assessment of Current Parking System Utilization

To determine parking system usage, off-street parking occupancy data will be collected for a typical weekday—Tuesday, Wednesday, or Thursday—every hour from 11:00 a.m. to 8:00 p.m. Occupancy data will be collected during the same period for on-street facilities as well. The on-street data will be categorized by use and time restrictions (e.g., handicap, loading, reserved, 2-hour limit) and the off-street data by lot. This will be consistent with the database and mapping created as part of Task III.

For on-street facilities, parking duration and turnover measurements also will be conducted in representative areas. The duration and turnover measurements will be obtained in conjunction with the occupancy data collection. We will record this information and summarize it by block; by parking type—curb or lot; and by parking analysis zone. This information will be analyzed and displayed in formats that reveal utilization and occupancy levels by time of day.

We also propose providing specific observations of weekend parking utilization. For this area, we proposed to perform parking occupancy and turnover measurements on one Friday and one Saturday evening from 5:00 p.m. – 10:00 p.m.

Using our knowledge of parking theory and the parking industry, as well as the parking utilization and occupancy data developed as part of Task IV, we will identify areas of particular concern in terms of parking sufficiency, or areas with a significant surplus of parking capacity. This understanding of where actual utilization exceeds intended utilization, or vice versa, will enable us to determine strategies for the Ninth Street area.

We propose to use a combination of the parking utilization and occupancy data to determine areas of peak vehicular accumulation for different time periods throughout the day —morning, noon, and afternoon. As part of this analysis, we will identify the peak hour(s) for the different facility types—private, on-street, and off-street.

We will perform a turnover analysis that will compute average length-of-stay statistics based on the parking occupancy and utilization data. This analysis will be conducted using spreadsheets that will be included in the Appendix of the final report. The length-of-stay analysis will show vehicle accumulation patterns throughout the day. This analysis also will highlight any widespread issues with overstay when compared to time limit restrictions.

If available, Kimley-Horn will use historical data provided by the City to perform a general analysis of trends related to changes in the parking supply.

Kimley-Horn will provide graphic output of the parking system utilization data collected in this task. If GIS data is available for this mapping output, Kimley-Horn will provide one ArcGIS-based mapping file, with parking inventory data loaded in the mapping software.

The parking inventory will include a summary of capacity and occupancy data, in addition to other information obtained during Tasks III and IV.

Task V – Supply/Demand Analysis and Project of Future Parking Needs

Kimley-Horn will use the data collected in Tasks II through IV to conduct a supply/demand analysis of the study area. We will analyze the existing parking supply using shared parking techniques described in the Urban Land Institute publication on parking. As part of this task, we will discuss potential redevelopment and new developments in the study area and factor those changes into our parking analysis. Results of our analysis will be shown graphically, which will provide the City a means for visual representation of parking demand data and supply information.
The analysis will identify areas of high parking demand by different times of the day and on different days for existing and future conditions. Future conditions will assume known new development and redevelopment as agreed upon by the PST.

Kimley-Horn will develop a report that identifies the assumptions and findings of the parking demand and supply in the Ninth Street area. The report will include the conditions observed and the analysis of the existing and future supply and demand. It is assumed that Kimley-Horn will provide a draft version of this report to the PST for review and comment. After receipt of comments, Kimley-Horn will finalize the document and provide hard and electronic versions of the report to the PST.

Task VI – Development of Supply Side Solutions

Using the data collected in Tasks II through V, and our experience with best practices from other cities, Kimley-Horn will evaluate the current parking supply and parking operations and provide recommendations in an effort to optimize use and management of the parking supply in the Ninth Street area. Potential recommendations could include modifications to current time restrictions, installation of parking meters, signage recommendations to increase the use of hard-to-find parking locations, and other parking management strategies.
Kimley-Horn will perform the following subtasks:

1. Review opportunities for more effective utilization of existing parking resources, including considerations of:
    a. Shared parking
    b. Improved information system and wayfinding
2. An assessment of the on-street parking supply on Ninth Street. The assessment shall include:
    a. A review of current City policies and parking system management practices related to:
        i. Use of time-limited parking (specific time limits)
        ii. Hours of enforcement

iii. Loading zone placement relative to demand

b. The factors that may make it effective to implement a fee for on-street parking using pay stations and/or multi-space meters.

c. A general assessment of identified enforcement deficiencies related to effectiveness and general goals established for the on-street parking program, including recommendations to address any such deficiencies.

d. An assessment of the current usage of handicapped parking placards in the study area, including occupancy statistics, turnover, and an opinion of abuse or detectable fraud. A rotating, four-hour inspection conducted over two days will be performed to observe the current handicapped parking conditions.

Kimley-Horn will prepare a technical memorandum with specific recommendations and action plans for on- and off-street solutions. The memorandum will include the following:

1. A matrix of alternatives evaluated, including for each alternative:
    a. Goals and objectives
    b. Key issues and challenges
    c. Schedule for implementation and proposed sequencing
    d. General assessment of applicability, effectiveness, and feasibility
2. An opinion of probable costs of the recommended alternatives.

Task VII – Recommendations and Financial Plan for Meeting Future Parking Needs
Using the information collected in previous tasks and input from the PST, Kimley-Horn will make recommendations for the type and size of additional parking facilities, if needed. The financial plan will include a projection of the costs associated with the recommended alternatives and an estimate of the parking revenues generated.

III. SCHEDULE:

We will provide the services described in all Tasks in the above Scope of Services as expeditiously as practicable to meet the mutually agreed upon schedule. Typically, a six (6) month timeframe from Notice-to-Proceed should be expected, subject to scheduling of client coordination meetings, coordination meetings, staff and City review time, and holiday schedules.

IV. PERIOD OF SERVICE:

This Supplemental Agreement shall be from June 18, 2012 to January 18, 2013.

V. COMPENSATION:

Kimley- Horn will provide the services described in the above Scope of Services for a

lump sum fee of $229,606.38 (including expenses: Downtown - $196,463.64, Ninth Street - $33,142.74); detailed below for budgetary purposes.

Downtown			
Labor	Kimley-Horn	Bree	Total
Task 1: Project Management	$ 15,558.48	$ 1,700.00	$ 17,258.48
Task 2: Review of Background Documentation Relating to Existing Conditions	$ 37,532.00	$ -	$ 37,532.00
Task 3: Inventory of Current Parking Capacity	$ 6,560.00	$ 2,640.00	$ 9,200.00
Task 4: Assessment of Current Parking System Utilization	$ 14,140.00	$21,230.00	$ 35,370.00
Task 5: Supply/Demand Analysis and Protection of Future Parking Needs	$ 28,168.00	$ -	$ 28,168.00
Task 6: Development of Supply Side Solutions	$ 11,920.00	$ -	$ 11,920.00
Task 7: Development of Demand Side Solutions	$ 6,040.00	$ -	$ 6,040.00
Task 8: Evaluation of Parking Policy and the Municipal Parking Program	$ 17,360.00	$ -	$ 17,360.00
Task 9: Development of Public Information Tools	$ 8,120.00	$ -	$ 8,120.00
Task 10: Recommendations and Financial Plan for Meeting Future Parking Needs	$ 13,984.00	$ -	$ 13,984.00
Labor Subtotal	$159,382.48	$25,570.00	$184,952.48
Expense Allocation	$ 6,410.30	$ 971.66	$ 7,381.96
Direct Expenses	$ 4,129.20	$ -	$ 4,129.20
Total	$169,921.98	$26,541.66	$196,463.64

Ninth Street			
Labor	Kimley-Horn	Bree	Total
Task 1: Project Management	$ 9,309.52	$ -	$ 9,309.52
Task 1: Review of Background Documentation Relating to Existing Conditions	$ 9,032.00	$ -	$ 9,032.00
Task 2: Inventory of Current Parking Capacity	$ 1,320.00	$ 440.00	$ 1,760.00
Task 3: Assessment of Current Parking System Utilization	$ 1,840.00	$ 1,760.00	$ 3,600.00
Task 4: Supply/Demand Analysis and Protection of Future Parking Needs	$ 2,480.00	$ -	$ 2,480.00
Task 5: Development of Supply Side Solutions	$ 1,700.00	$ -	$ 1,700.00
Task 6: Recommendations and Financial Plan for Meeting Future Parking Needs	$ 4,224.00	$ -	$ 4,224.00
Labor Subtotal	$ 29,905.52	$ 2,200.00	$ 32,105.52
Expense Allocation	$ 969.46	$ 67.76	$ 1,037.22
Direct Expenses	$ -	$ -	$ -
Total	$ 30,874.98	$ 2,267.76	$ 33,142.74

The lump sum fee includes all labor costs, overhead and reimbursable costs and expenses including subconsultants and direct expenses such as local cellular phone, in-house duplicating and blueprinting, facsimile, automobile mileage, telephone charges, postage, and computer expense. Fees will be invoiced monthly based upon the percentage of services performed as of the invoice date. Payment will be due in

accordance with the Master Agreement for Continuing Professional Services dated December 21, 2009.

The actual cost of direct labor, overhead and fee for the staff assigned to this work within each classification shall not exceed the rates in Attachment A of this Agreement without the written permission of the Client. The costs for this assignment shall not exceed $229,606.38, nor shall the consultant incur costs above $229,606.38.

Invoices for all compensation owed in accordance with this Agreement shall be submitted to the City on a monthly basis with sufficient detail (including progress reports, SDBE utilization report, etc.) to process the invoice for payment and for a proper pre-audit and post-audit thereof in accordance with City standards

VI. INSURANCE COVERAGE AND INDEMNIFICATION:

Consultant shall provide high risk insurance coverage as provided for in Section VII of the Master Agreement for Transportation Engineering and Planning Services.

VII. OTHER SPECIAL TERMS:

The City will provide the Consultant all pertinent information and data available to the City and deemed necessary to perform assigned tasks as listed in Client Responsibilities.

VIII. NOTICE:

All notices and other communications required or permitted by this Agreement shall be in writing and shall be given either by personal delivery, email, facsimile with telephone confirmation, or certified United States mail, return receipt requested, addressed as follows:

For the City:
Harmon E. Crutchfield, Assistant Transportation Director
Transportation Department
City of Durham
101 City Hall Plaza
Durham, NC 27701
The fax number is (919) 560-4561
Phone 919-560-4366 ext. 36439
Email: harmon.crutchfield@durhamnc.gov

For **the** Consultant:
Frank Burchett, P.E., PTOE
Kimley-Horn & Associates, Inc.
3001 Weston Parkway
Cary, NC 27513
Phone 919-677-2085
Email: Fred.Burchett@kimley-horn.com

This instrument has been pre-audited in the manner required by the Local Government Budget and Fiscal Control Act.

_____ _____
City's Finance Officer Date

CITY OF DURHAM
ATTEST:

_____ By: _____

Pre-audit Certification, if necessary:

PB ATTEST:

_____ *By:* _____
xxx xxx, Vice President Secretary
(affix corporate seal)

_____
Xxxxx xxx, title (Full name)

ACKNOWLEDGEMENT BY CORPORATION
State of North Carolina
County of _____

I, a notary public in and for the aforesaid county and state, certify that xxxx xxxx personally (1) appeared before me this day and (2) stated that he is Title (i.e. President or Vice President) of Parsons Brinckerhoff. a Professional Corporation organized and existing under the laws of the State of North Carolina, (3) acknowledge that the foregoing contract or agreement with the City of Durham carries on in the usual way the company's business, and (4) acknowledged the due execution of the contract on behalf of the company. This the_____ day of _____, 2011.

My commission expires:

_____ _____

Notary Public